

**Page Denied**

Next 1 Page(s) In Document Denied

~~SECRET~~

The Director of Central Intelligence

Washington, D.C. 20505

Intelligence Research and Development Council

6 May 1981

MEMORANDUM FOR: Deputy Director of Central Intelligence

FROM: [REDACTED]  
Executive Director

SUBJECT: A Status Report

25X1

1. We are still awaiting confirmation of Dr. DeLauer as Under Secretary of Defense for Research and Engineering so that we may extend an invitation for him to assume the Chairmanship of the Intelligence Research and Development Council. However, in the meantime, I thought you might be interested in a recap of certain on-going Council activities. (C)

a. Second National Digital Imagery Symposium

Two years ago the Council sponsored a National Digital Imagery Processing and Exploitation Symposium. The symposium was staffed by the Exploitation Research and Development Subcommittee (EXRAND) of COMIREX. The symposium was held at NPIC, had about 200 attendees, lasted a week, and consisted of numerous sessions and tours with over 60 papers being presented by members of the Federal Government, industry and academia. In the wrap-up report of the symposium steering group, it was recommended that future symposiums be held to continue the exchange of digital imagery technology among the many diverse participants involved in imagery processing and exploitation. (S)

I have asked the members of the Council to offer me their views on sponsoring a second symposium (Attachment A). If they agree, I will draft a tasking letter to the Chairman, EXRAND, to be signed by either Dr. DeLauer, if he is on board, or if not, for your release. EXRAND would like to commence their work some time this month with a target date for the symposium of October or November. (S)

b. DCI STAP/IR&DC Technology Trends Colloquium

I have had preliminary discussions with [REDACTED] Chairman, STIC, concerning the possibility of having a combined DCI STAP/IR&DC Technology Trends Colloquium on emerging technologies for the late 1980s. [REDACTED] believes such a joint venture might be profitable and

25X1

25X1

THIS DOCUMENT MAY BE DOWNGRADED TO  
SECRET UPON REMOVAL OF ATTACHMENT B  
AND HANDLING CAVEATS

25X1

WARNING NOTICE  
INTELLIGENCE SOURCES  
AND METHODS INVOLVED

~~SECRET~~

~~SECRET~~

SUBJECT: A Status Report

will discuss the proposal with the Chairman, STAP, who in turn will talk to the new Chairman, IR&DC. - The benefit of such a joint venture would be to couple and focus scientific opinions from within, as well as exterior to, the Intelligence Community on what developing technologies may be able to increase our intelligence capabilities. (C)

c. Future Technological Advancements

In the vein of identifying what opportunities emerging technologies may offer for increasing our future capabilities, I have had the Council members outline what their perceptions are for the future. Six areas have been identified where major changes are forecast:

- o Solid State Electronic Technology
- o Computer Technology
- o Space Science
- o Sensors and Antenna Technology
- o Human Performance
- o Laser Technology. (S)

The attached listing (Attachment B) indicates more specifically within these areas where advancements may occur. I intend to discuss these projections with the new chairman to suggest how the Council might seek out and keep aware of advancements within these fields for possible use by the Intelligence Community. (C)

d. New IR&DC Initiatives

The following are several new initiatives which may be sponsored by the Council. These initiatives will tend to provide for more community cohesiveness in our Research and Development Programs and at the same time provide for tangible reward for our intelligence scientific personnel.

~~SECRET~~

SUBJECT: A Status Report

The Council will:

- o Sponsor a DCI Scientific Fellowship Program.
- o Sponsor Periodic National Intelligence R&D Symposium.
- o Sponsor a yearly DCI Exceptional Scientific Awards Program.
- o Sponsor a DCI Distinguished Scientific Speaker Program.
- o Provide recommendations to the DCI concerning NFIP R&D programs which will be issued in the annual DCI NFIP Program Guidance. (C)

2. The above outlines Council considerations which are now being formulated, but of course are subject to your guidance and direction. I understand that Dr. DeLauer's confirmation may occur in the next few weeks.  
(C)



25X1

Attachments:

- A. Memo for Distribution,  
Subj: A Second National Digital  
Imagery Symposium dtd 1 May 81  
(ICS 81-0705)
- B. Future Technological Advances

SECRET

25X1

SUBJECT: A Status Report

Distribution: [redacted] all copies with Attachments)

25X1

Copy 1 - DDCI  
2 - ER  
3 - D/ICS  
4 - A-DD/ICS  
5 - A-DD/ICS  
6 - EO/ICS  
7 - D/CLLS  
8 - D/IRO  
9 - D/PAO  
10 - D/PBO  
11 - PBO/[redacted]  
12 - AD/PGS  
13 - C/CPG  
14 - D/NCPO  
15 - D/PTO  
16 - D/HTO  
17 - D/STO  
18 - IR&DC Chrono  
19 - ICS Registry

25X1

25X1

ICS/IR&DC [redacted] (6 May 81)

25X1

The Director of Central Intelligence  
Washington, D.C. 20505

Intelligence Research and Development Council

ICS 81-0705  
1 May 1981

25X1

MEMORANDUM FOR: Distribution

FROM: [REDACTED]  
Executive Director

SUBJECT: A Second National Digital Imagery Symposium

25X1

1. I have been contacted by [REDACTED] of the EXRAND Subcommittee of COMIREX soliciting Council sponsorship of a second National Symposium on Digital Imagery Processing and Exploitation sometime this coming fall. EXRAND would staff the symposium with Council assistance and guidance. The first symposium was held in October 1979 at NPIC, had close to 200 attendees, lasted for a week, and consisted of numerous sessions and tours with over 60 papers being presented. By all accounts the symposium was a success and the steering committee in their wrap-up report recommended that future symposiums be held to continue the exchange of digital imagery technology advancements among the many diverse participants involved in imagery processing and exploitation.

2. I believe this is a worthwhile Community project for the Council to continue to sponsor and suggest that we endorse the EXRAND proposal. Therefore will you please provide me your views on this matter by 11 May, and if we agree that a second symposium will be useful, then appropriate tasking will be issued to EXRAND so that they may commence their planning.

25X1

cc: Deputy Director of Central Intelligence  
Under Secretary of Defense for Research  
and Engineering-Designate (Dr. DeLauer)

25X1

WARNING NOTICE  
INTELLIGENCE SOURCES  
AND METHODS INVOLVED

SECRET

**Page Denied**

~~CONFIDENTIAL~~

## Computer Technology

Future computer technology advancements will provide levels of magnitude of increase in the speed of data manipulation and data retrieval. This will be permitted by marked improvements in very high speed integrated circuitry and very large scale integration. Areas to be affected by these new capacities will include:

- o progress towards the development of artificial intelligence
- o better use of robotics
- o enhanced management science application techniques
- o increased optical and recording processing and storage technology
- o more interactive computer graphic design
- o different ways of software engineering
- o new voice input/output technology consisting of:
  - computer recognizable 1000 word vocabularies
  - improvements using VHSIC and VLSI to:
    - speedily machine-gist text and conversations
    - provide an effective environment for transcriptions, for example digital filters, random search on words and the search of the previous day's intercept
    - develop machine-aided translations to improve productivity of scarce linguistic resources and reduce training time
    - continue the development of wordspotting systems to include the development of a reliable speech detection algorithm. (C)

WARNING NOTICE  
INTELLIGENCE SOURCES  
AND METHODS INVOLVED

~~CONFIDENTIAL~~

**Page Denied**

Next 3 Page(s) In Document Denied